

Notice of Allowability

Application No.

09/755,444

Examiner

Hai V. Nguyen

Applicant(s)

HERICOURT, OLIVIER

Art Unit

2142

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to the communication received on 19 May 2005.
2. ☒ The allowed claim(s) is/are 1-13.
3. ☒ The drawings filed on 05 January 2001 are accepted by the Examiner.
4. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☒ All b) ☐ Some* c) ☐ None of the:
 1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

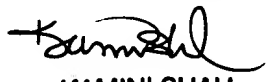
Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
 6. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
 - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☐ Information Disclosure Statements (PTO-1449 or PTO/SB/08),
Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit
of Biological Material
5. ☐ Notice of Informal Patent Application (PTO-152)
6. ☒ Interview Summary (PTO-413),
Paper No./Mail Date 09/06/2005 06/09/2005
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____


KAMINI SHAH
PRIMARY EXAMINER

EXAMINER'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.
2. Authorization for this examiner's amendment was given in a telephone interview with Applicant's Representative, Mr. Ronald D'Alessandro, Registration number: 42,456 on 09 June 2005.

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IN THE CLAIMS

Please amend claims 8, 10 as follows:

1. (Previously Presented) A method of dispatching an IP datagram comprising socks traffic on a socks server, in an Internet Protocol (IP) network comprising a plurality of socks servers, said method comprising the steps of:

in a socks dispatcher:

retrieving the value of a Type Of Service (TOS) field from the IP header of the IP datagram;

determines one or a plurality of socks servers defined for the value of the Type Of Service (TOS) field retrieved from the IP datagram, one or a plurality of Type Of Service (TOS) values being defined for each socks server;

determines an application level protocol of data transported in the IP datagram, the application level protocol being defined for each value of the Type OF Service (TOS) field; and

if more than one socks server is defined for the value of the Type Of Service (TOS) field retrieved from the IP datagram, forwarding the IP datagram to a socks server selected according to one or a plurality of selection parameters, one selection parameter being the application level protocol previously determined.

2. (Previously Presented) The method according to claim 1, comprising the further step of:

determining a priority of the IP, the priority being defined for each value of the Type of Service field.

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3. (Previously Presented) The method according to claim 2, wherein one selection parameter is the priority previously determined.

4. (Previously Presented) The method according to claim 1 or 2, comprising the further step of:

determining a capacity of the one or a plurality of socks servers defined for the value of the Type of Service (TOS) field retrieved from the IP datagram, a socks server capacity being defined for each socks server.

5. (Previously Presented) The method according to claim 4, wherein one selection parameter is capacity of the one or a plurality of socks servers.

6. (Previously Presented) The method according to claim 5, wherein in case of congestion in one or a plurality of output queues, the step of determining the priority of the IP datagram is followed by the further steps:

discarding in the one or a plurality of output queues IP datagrams having a lowest priority until there is no more congestion.

discarding the IP datagram when the IP datagram compared with IP datagrams in the one or a plurality of output queues, has the lowest priority.

7. (Previously Presented) The method according to claim 1 or 2 wherein a first table, said first table comprises for each sock server:

an identifier, preferably an address;

one or a plurality of TOS field values;

optionally, a sock server capacity; and

optionally, application level protocols supported by the socks server.

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8. (Currently Amended) A socks dispatcher comprising:

an IP intranet network comprising a plurality of socks servers; and

an IP datagram comprising an IP header, said IP header comprising a Type Of Service (TOS) field wherein said socks dispatcher

retrieves a value of said TOS field from the IP header of the IP datagram;

determines one or a plurality of socks servers defined for the value of the Type Of Service (TOS) field retrieved from the IP datagram, one or a plurality of Type Of Service (TOS) values being defined for each socks server;

determines an application level protocol of data transported in the IP datagram, the application level protocol being defined for each value of the Type Of Service (TOS) field; and

if more than one socks server is defined for the value of the Type Of Service (TOS) field retrieved from the IP datagram, forwarding the IP datagram to a socks server selected according to one or a plurality of selection parameters, one selection parameter being the application level protocol previously determined.

9. (Previously Presented) A dispatcher according to claim 8 further comprising an IP network device wherein said IP datagram is sent by said IP network device with a given priority, and wherein said retrieving step is followed by a step of:

determining the priority of the IP datagram by referring to a second table, said second table defining a priority for each value of the Type of Service (TOS) field.

10. (Currently Amended) A computer program product on a computer readable medium having computer readable program code for dispatching an IP datagram

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comprising socks traffic on a socks server, in an Internet Protocol (IP) intranet network comprising a plurality of socks servers, said IP datagram comprising an IP header comprising a Type Of Service (TOS) field, said computer readable program code comprising the steps of: in a socks dispatcher:

computer readable program code means for retrieving a value of said Type Of Service (TOS) field from the IP header of the IP datagram;

computer readable program code means for determining one or a plurality of socks servers defined for the value of the Type Of Service (TOS) field retrieved from the IP datagram, one or a plurality of Type Of Service (TOS) values being defined for each socks server;

computer readable program code means for determining an application level protocol of data transported in the IP datagram, the application level protocol being defined for each value of the Type Of Service (TOS) field; and

if more than one socks server is defined for the value of the Type Of Service (TOS) field retrieved from the IP datagram, forwarding the IP datagram to a socks server selected according to one or a plurality of selection parameters, one selection parameter being the application level protocol previously determined.

11. (Previously Presented) The computer program product according to claim 10 wherein said IP datagram is sent by an IP network device with a given priority, and wherein said step of retrieving the value of the Type of Service (TOS) field is followed by the further step of:

in the socks dispatcher:

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computer readable program code means for determining the priority of the IP datagram by referring to a second table, said second table defining a priority for each value of the Type of Service (TOS) field.

12. (Previously Presented) The method according to claim 7 wherein a second table comprises for each value of the Type of Service field:

a priority; and

optionally, an application level protocol.

13. (Previously Presented) The method according to claim 12, comprising the initial steps of:

configuring the first and second tables;

defining a default socks server for values of the Type of Service field not defined in the first table; and

defining a default priority and optionally a default application level protocol for values of the Type of Service (TOS) field not defined in the second table.

Reasons For Allowance

3. The following is an examiner's statement of reasons for allowance:

The primary reason for allowance of the claims is based on the inclusion of the limitation of "determining an application level protocol of data transported in the IP datagram, the application level protocol being defined for each value of the Type Of Service (TOS) field; and if more than one socks server is defined for the value of the Type Of Service (TOS) field retrieved from the IP datagram, forwarding the IP datagram to a socks server selected according to one or a plurality of selection parameters, one selection parameter being the application level protocol previously determined". The prior art, U.S. patent no. 6,443,647 B1 does not teach this limitation.

4. The Examiner's interpretation of the claim language is also based upon Applicant's the enabling portions of the specification, (Fig. 9, pages 11-12, 17-18) and Applicant's remark on pages 9-11 of paper received on 25 March 2005. Therefore, Applicant's instant claims are considered to be allowable.

5. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

6. **Claims 1-13** are allowed.

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Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hai V. Nguyen whose telephone number is 571-272-3901. The examiner can normally be reached on 6:00-3:30 Mon-Fri.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew Caldwell can be reached on 571-272-3868. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Hai V. Nguyen
Examiner
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KAMINI SHAH
PRIMARY EXAMINER